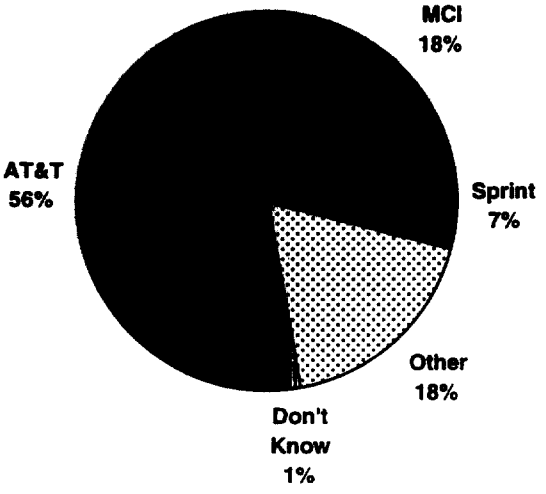
Current Telecommunications Environment

	Total	1-4 Lines	5-24 Lines	25-99 Lines	100+ Lines
Average Number of Lines and Trunks	14.3	2.3	8.3	42.1	588.9
Average Number of Main Lines	3.0	1.5	2.2	6.0	79.8
Average Number of Other Lines	11.2	0.8	6.2	36.1	507.0
Average Total Monthly Bill	$966	$149	$757	$5,495	$30,305
Average Long Distance Bill	$563	$67	$366	$5,247	$13,738
Incidence of Specific Telecom Products:					
Single line phone/1 MB's	65%	70%	50%	72%	67%
Centrex	14%	8%	19%	51%	84%
PBX	12%	4%	17%	72%	86%
Key System/KSU	12%	9%	15%	23%	50%
Voice mail	16%	9%	25%	47%	96%
T-1's	10%	7%	7%	51%	85%
Least Cost Routing	10%	4%	13%	71%	93%
DID Numbers	1%	--	--	4%	34%
800 Numbers	24%	18%	30%	65%	94%
Number of locations	2.6	1.3	2.1	3.5	56.2
Telecom Decision-making (if 2+ locations)					
Centralized	53%	40%	72%	30%	59%
Decentralized	38%	41%	24%	64%	41%
	(n=172)	(n=26)*	(n=61)	(n=35)*	(n=44)*
Use telecommunications consultant	11%	7%	17%	37%	21%
Yellow Pages advertiser	68%	69%	64%	69%	50%
Stationery re-print cycle:					
Every 6 months	8%	5%	17%	6%	8%
Every 6 months - 1 year	17%	12%	28%	28%	7%
Every 1 - 2 years	25%	26%	24%	9%	39%
Every 2 - 3 years	15%	18%	7%	22%	8%
Every 3 years or more	23%	23%	24%	8%	36%
Likely to move in next 2 years	21%	18%	25%	12%	15%
Percent of Business Population	100%	68%	24%	4%	2%
(unweighted n)	(n=519)	(n=206)	(n=182)	(n=57)	(n=58)

* Small sample size; use caution when projecting results

Current Long Distance Vendor

Total

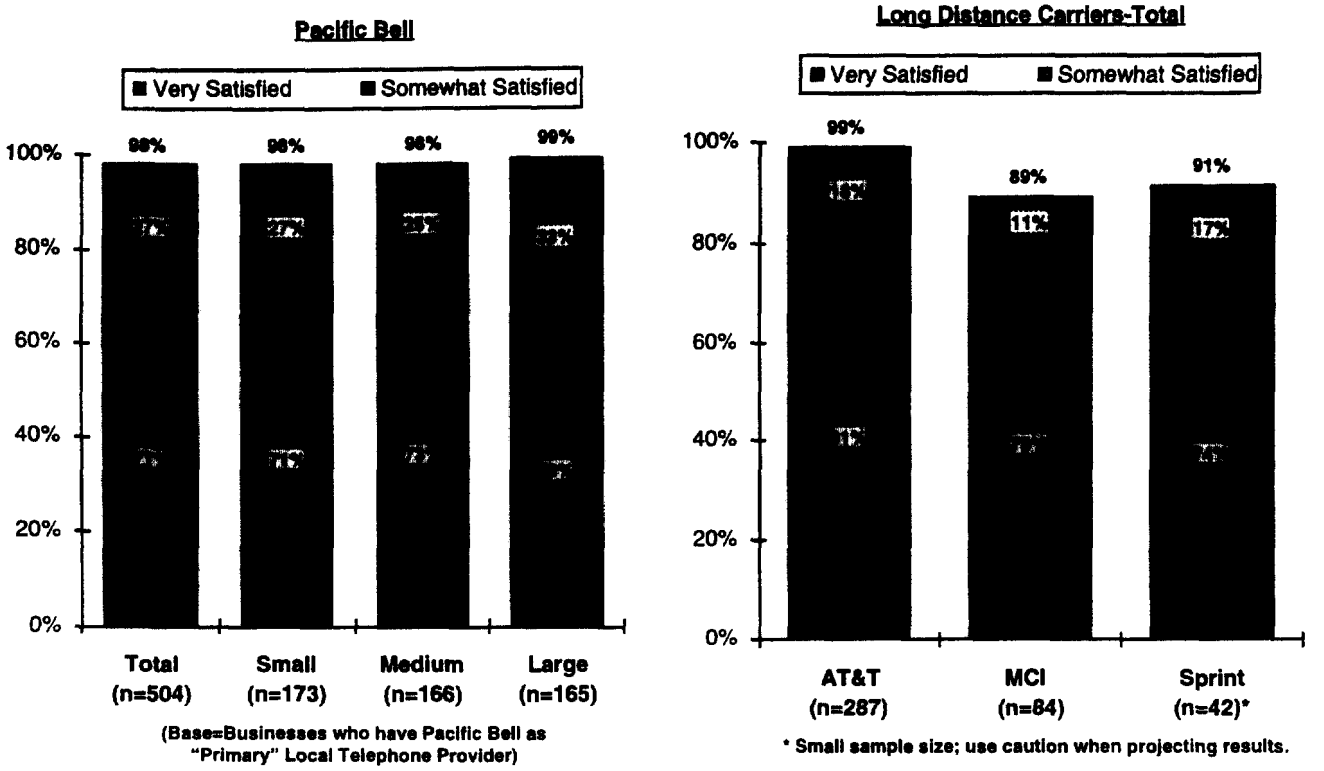


(n=519)

	By Number of Employees		
	Small	Medium	Large
AT&T	55%	58%	50%
MCI	19%	14%	18%
Sprint	8%	4%	16%
Other	17%	23%	16%
Don't Know	1%	1%	0%
	(n=179)	(n=170)	(n=170)

While AT&T continues to retain the majority of the long distance market (56%), a substantial portion of businesses (18%) are using smaller (non-Big 3) companies as their primary long distance company. Additionally, among large businesses (100+ employees), Sprint's share is substantially higher (16%).

Satisfaction with Current Vendors



In considering whether a business will be likely to switch to an alternate local access provider, the satisfaction with current vendors should be considered. While almost three quarters (71%) are "very satisfied" with Pacific Bell, satisfaction with AT&T (81%) is significantly higher.

	Total	Small Businesses	Medium Businesses	Large Businesses
Changed Main Number	27%	27%	25%	32%
Use RCF/Number Retention	14%	10%	13%	20%
	(n=519)	(n=179)	(n=170)	(n=170)
Among those who use RCF...				
Will always keep service	69%	75%	50%	47%
Will stop service after 1 year	16%	13%	27%	21%
Will stop service after 2 years or more	11%	6%	23%	30%
	(n=72)	(n=16)*	(n=22)*	(n=34)*

* Small sample size; use caution when projecting results.

About a quarter (27%) of all businesses had changed their main number at some point in the past and one-tenth (10%) of all businesses were currently using RCF or a number retention service, suggesting that they would have less resistance, if any, to switching local service providers. This finding was originally discovered in the focus groups and reflected a willingness, among some businesses, to pay to keep their telephone number.

The majority (69%) of those businesses currently using RCF intended to always use the service to retain that number. While a greater proportion of large businesses were using RCF (20%), they were less likely than small business to always keep the service.

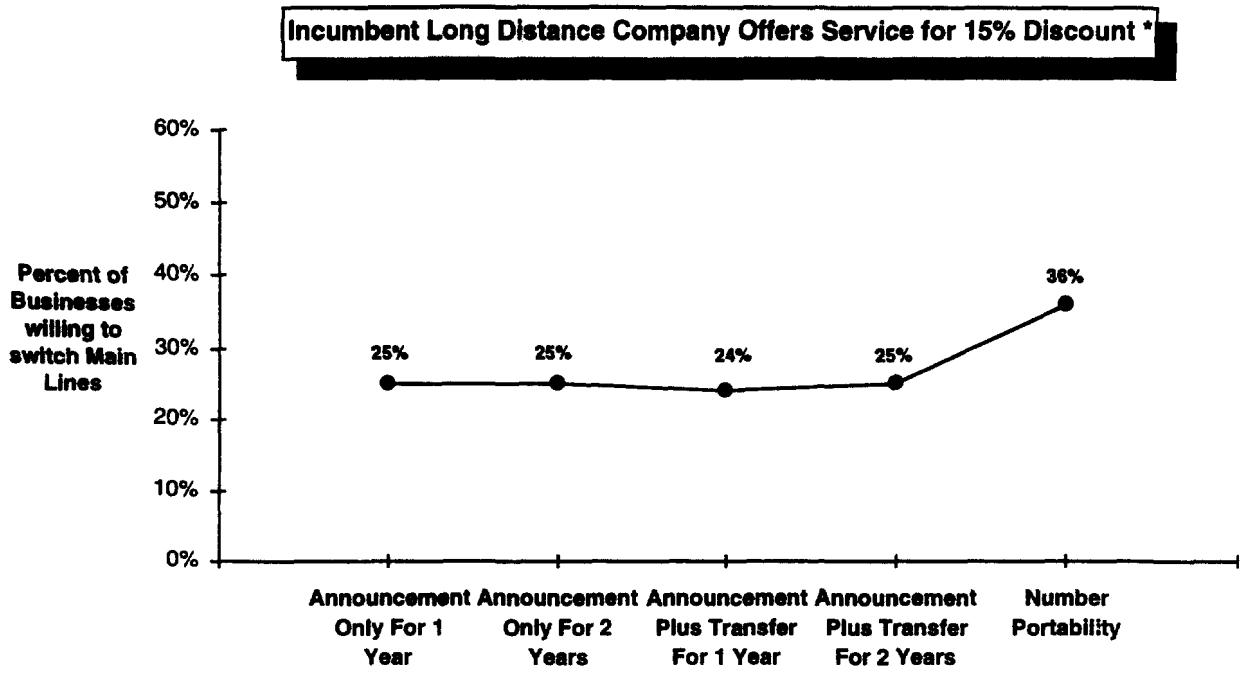
Impact of Elements on Willingness to Switch Providers

The following section outlines the relative influence of each of the major items that were included in the conjoint analysis. By holding all but one element constant, the influence of that element can be determined.

For consistency, a probable scenario was selected as the baseline for these comparisons. This scenario is: a long distance company offering local, toll and long distance services at a 15% discount (on local and toll), requiring a number change and an announcement for 1 year.

The results show both the percent of businesses that are willing to switch under any given scenario as well as the percent of all lines that would be switched under that scenario. When broken out by type of line (main, "other", DID), these percentages are based to businesses who have that type of line or to the universe of that type of line. For example, the percent of businesses that would switch "other lines" is based to the businesses who have "other lines." Similarly, the percent of all "other lines" switched is based to the universe of all "other lines."

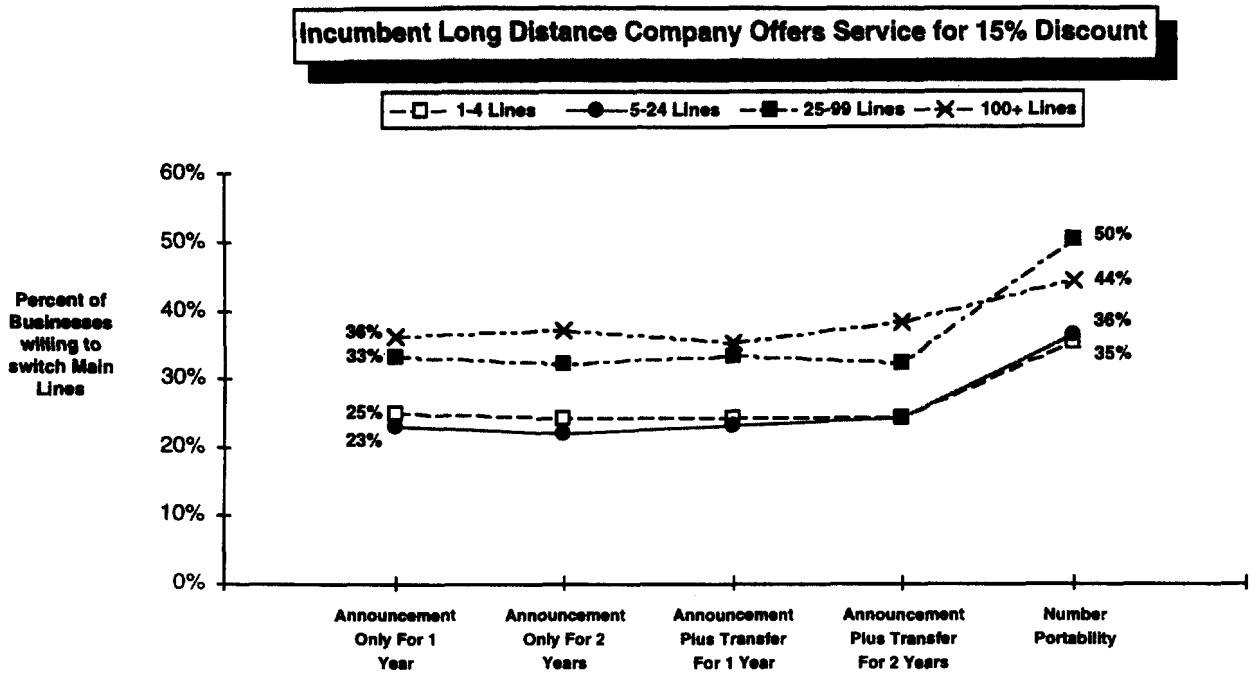
Finally, the results are also broken out by business line size (i.e., the total number of lines a business has.)



(Percent of Businesses Scale: 4=75%, 3=50%, 2=25%, 1=0%)

Regardless of the technological solution offered (e.g., announcement for one year versus announcement and transfer for two years), when an incumbent long distance telephone company bundles long distance, local and toll services at a 15% discount but requires a number change, approximately one-quarter of the businesses would switch their main lines. However, when offered number portability under the same scenario, more than one-third (36%) of the businesses would switch their main lines. This finding suggests that the issue to businesses is the ability to keep their number and, relative to that, the specific type of number change announcement offered is inconsequential.

* Results for additional discount levels included in Appendix



(Percent of Businesses Scale: 4=75%, 3=50%, 2=25%, 1=0%)

When analyzing the impact of technological solutions by line size, similar conclusions can be made. Within each segment, the percent of businesses that would switch their main lines remains relatively the same, regardless of the technological solution offered to mitigate the impact of a number change.

However, once number portability is offered, there are increases for each business category in the amount of businesses willing to switch main lines. When comparing business categories, number portability appears to have the greatest impact on businesses with 25-99 lines, with half (50%) willing to switch if they can keep their number (an increase of +17 over an announcement for 1 year). On the other hand, the largest businesses (100+ lines) are the least impacted by number portability (36% to 44%). Additionally, as will be seen throughout this report, larger businesses tend to be more likely to switch in general.

Incumbent Long Distance Company offers Service for 15% Discount *

	Announcement Only For 1 Year	Announcement Only For 2 Years	Announcement With Transfer For 1 Year	Announcement With Transfer For 2 Years	Number Portability
Percent of Businesses willing to switch: (Based to universe of businesses with specific line type)					
Main Lines	25%	25%	24%	25%	36%
Other Lines	27%	27%	27%	28%	37%
DID Numbers	36%	36%	35%	36%	44%
Percent of all lines that would be switched: (Based to universe of lines)					
Main Lines	14%	14%	14%	14%	30%
Other Lines	21%	23%	19%	21%	29%
DID Numbers	9%	9%	9%	9%	25%

(Percent of Businesses Scale: 4=75%, 3=50%, 2=25%, 1=0%)

If an incumbent long distance company were to offer long distance, local and toll services at a 15% discount, 14% of all main lines would be switched if a business had to change its number. However, with number portability, 30% of all main lines would be switched.

As expected, when a number change occurs, a greater percent of "other lines" will be switched compared to main lines (e.g. 21% versus 14% for announcement for 1 year). However, with number portability, this difference disappears (29% versus 30%). Additionally, "other" lines are more typically used for outbound traffic while main lines are reserved for inbound calls. Therefore, while about the same percent of "other" lines (29%) and main lines (30%) would be switched if number portability was available, the actual amount of usage revenue Pacific Bell would lose may be substantially different.

Under this same scenario, it appears that there is a higher willingness (36%) to switch DID numbers even if the phone numbers change. However only 9% of all DID numbers would be switched. If number portability was available, 44% of the business respondents would switch their DID numbers, affecting one-quarter (25%) of all DID numbers.

* Results for additional discount levels included in Appendix

Incumbent Long Distance Company offers Service for 15% Discount *

	[redacted]				[redacted]			
	Number of Lines				Number of Lines			
	1-4	5-24	25-99	100+	1-4	5-24	25-99	100+
Percent of Businesses willing to switch: (Based to universe of businesses with specific line type)								
Main Lines	25%	23%	33%	36%	35%	36%	50%	44%
Other Lines	26%	27%	42%	41%	35%	38%	55%	48%
Percent of all lines that would be switched: (Based to universe of line type)								
Main Lines	16%	13%	26%	6%	27%	23%	53%	20%
Other Lines	13%	20%	20%	20%	18%	27%	32%	27%

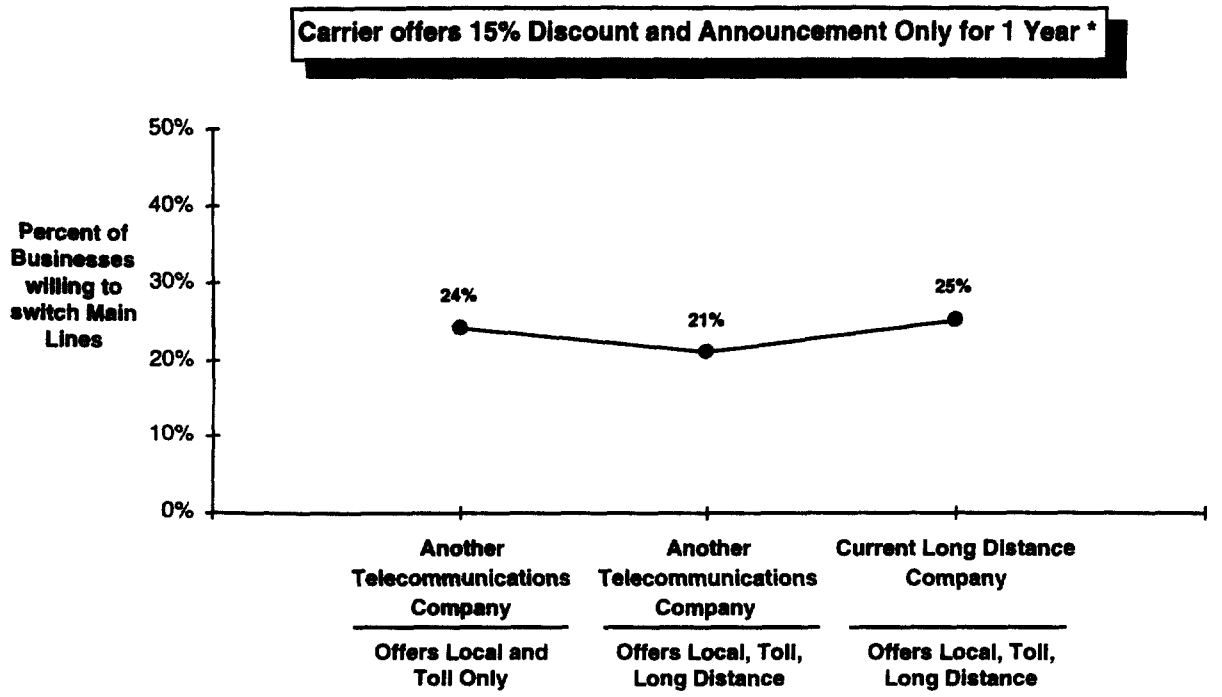
(Percent of Businesses Scale: 4=75%, 3=50%, 2=25%, 1=0%)
(Note: Data for DID Numbers are not shown as the sample sizes within segments are too small for analysis).

If an incumbent long distance company offered local, toll and long distance services at a 15% discount, with an announcement for 1 year, approximately one-third of businesses with 25 or more lines (33%-36%) would be willing to switch their main lines compared to only a quarter (23%-25%) of smaller businesses (under 25 lines). Businesses with 25 or more lines would also be more willing than smaller businesses to switch their "other" lines (42% versus 26%).

While the amount of large businesses (100+ lines) willing to switch their main line without number portability is relatively high (36%), the actual change by adding number portability is +8, slightly less than the increase of +11 for all businesses. It would seem that number portability in itself has less incremental influence on a larger business' willingness to switch.

* Results for additional discount levels included in Appendix

Impact of "Brand" and Service Bundling



(Percent of Businesses Scale: 4=75%, 3=50%, 2=25%, 1=0%)

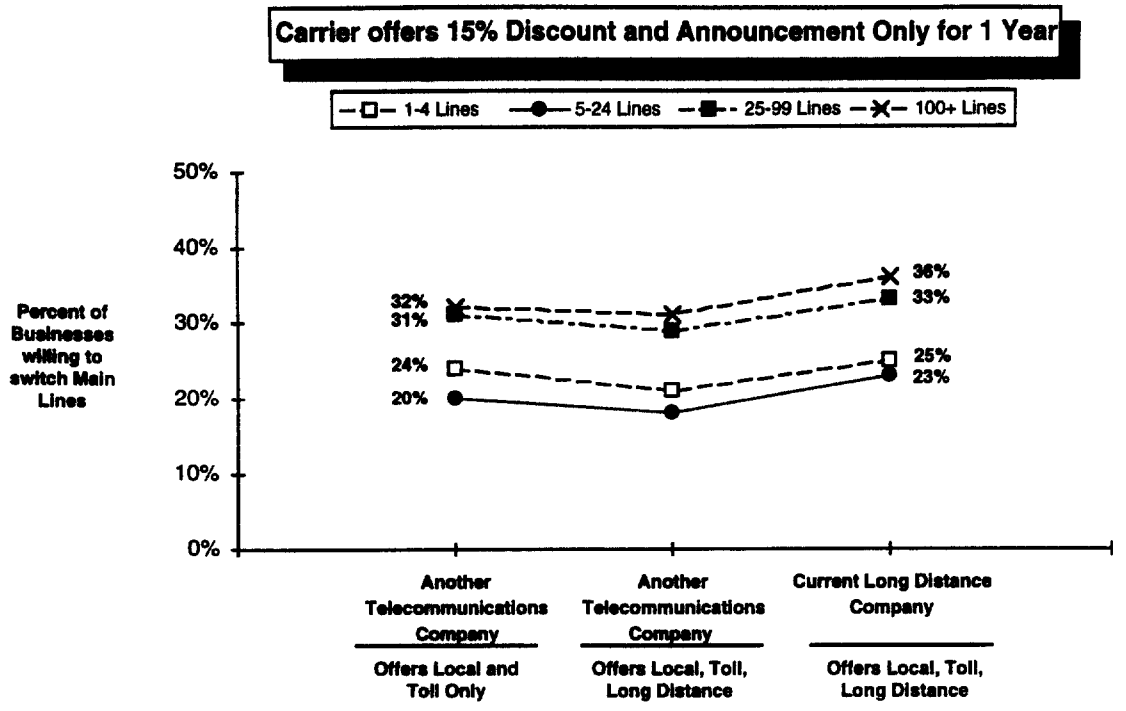
The brand of the local access provider and service bundling have relatively low impact on a business' willingness to switch relative to other elements (such as price or impact on number), suggesting that most potential alternative providers will have an equal baseline to start from. For example, in the scenario shown above, there is only a variance of 4% between the three brand/service bundling alternatives.

If, under this scenario, another telecommunications company was to offer local and toll services only, one-quarter (24%) of businesses would switch their main lines. However, if another telecommunications company was to bundle local, toll and long distance services, the percent of businesses willing to switch is slightly less (21%). This data supports a finding from the qualitative phase that some businesses do not want all their telecommunications services with a lesser known brand, as it may present a risk (i.e., put all their eggs in one basket).

However, with an incumbent long distance company, the risk of bundling services appears to be mitigated (25% of businesses are willing to switch under this scenario).

* Results for additional discount levels included in Appendix

Impact of "Brand" and Service Bundling



(Percent of Businesses Scale: 4=75%, 3=50%, 2=25%, 1=0%)

When analyzing the relative impact of brand and service bundling on businesses of varying size, the effects of these elements appear to be quite similar. In each category, businesses appear to be slightly more reticent, when considering an unfamiliar telecommunications provider, to bundle all telecommunications services versus just local and toll services.

However, if the incumbent long distance company was to offer local, toll and long distance services, businesses in each category show slightly more willingness to switch.

Impact of "Brand" and Service Bundling

Carrier offers 15% Discount and Announcement Only for 1 Year *

	Another Telecommunications Company Offers Local and Toll Only	Another Telecommunications Company Offers Local, Toll, LD	Current Long Distance Company Offers Local, Toll, LD
Percent of Businesses willing to switch: (Based to universe of businesses)			
Main Lines	24%	21%	25%
Other Lines	26%	24%	27%
DID Numbers	35%	33%	36%
Percent of all lines that would be switched: (Based to universe of lines)			
Main Lines	13%	11%	14%
Other Lines	20%	16%	21%
DID Numbers	8%	7%	9%

(Percent of Businesses Scale: 4=75%, 3=50%, 2=25%, 1=0%)

The brand of service provider and the services bundled have relatively low impact on a business' willingness to switch, regardless of line type.

Again, if an unknown telecommunications company offers all telecommunications services, businesses are generally less inclined to switch lines. In fact, only 11% of main lines and 16% of "other" lines would be switched to the unknown telecommunications company.

* Results for additional discount levels included in Appendix

Impact of "Brand" and Service Bundling

Carrier offers 15% Discount and Announcement Only for 1 Year *

[redacted] [redacted] [redacted]

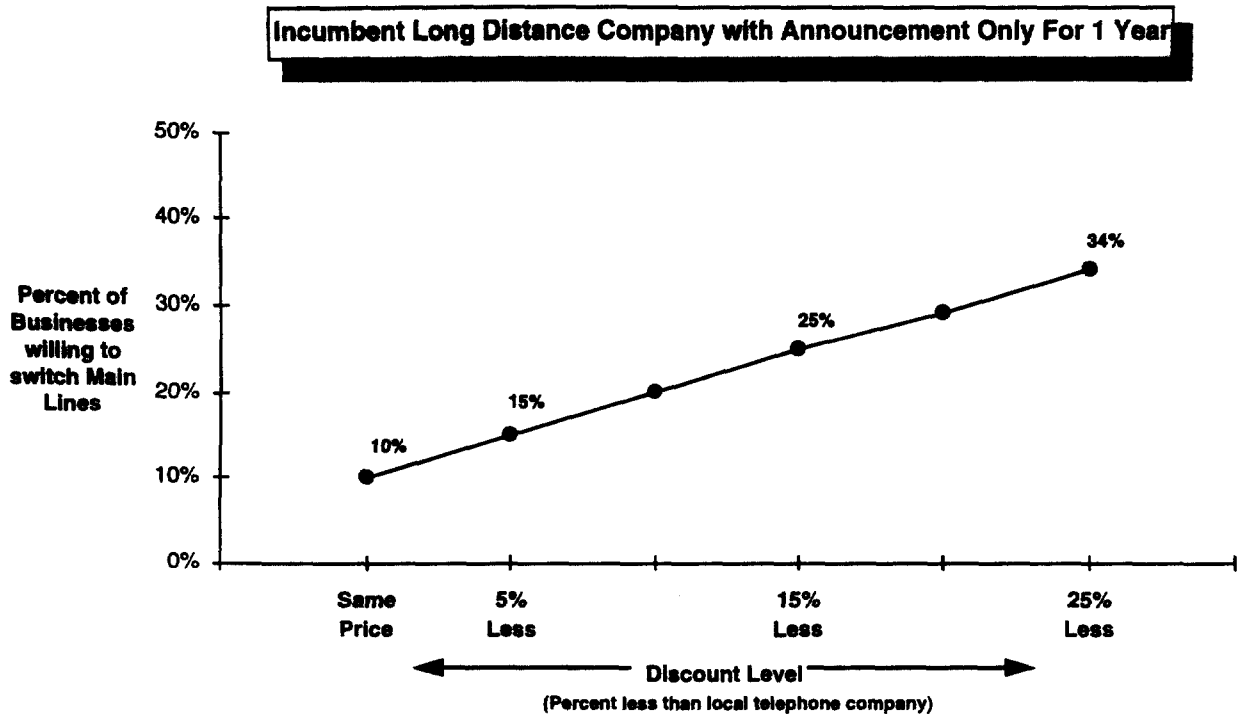
	Number of Lines				Number of Lines				Number of Lines			
	1-4	5-24	25-99	100+	1-4	5-24	25-99	100+	1-4	5-24	25-99	100+
Percent of Businesses willing to switch: (Based to universe of businesses with specific line type)												
Main Lines	24%	20%	31%	32%	21%	18%	29%	31%	25%	23%	33%	36%
Other Lines	25%	24%	39%	38%	23%	23%	37%	37%	26%	27%	42%	41%
Percent of all lines that would be switched: (Based to universe of lines)												
Main Lines	16%	10%	27%	6%	14%	9%	25%	4%	16%	13%	26%	6%
Other Lines	13%	15%	21%	19%	12%	16%	16%	15%	13%	20%	20%	20%

(Percent of Businesses Scale: 4=75%, 3=50%, 2=25%, 1=0%)

(Note: Data for DID Numbers are not shown as the sample sizes within segments are too small for analysis).

Across business sizes, the impact of brand and service bundling does not vary much. In all cases, another telecommunications company offering local, toll and long distance results in slightly fewer businesses being willing to switch than if the incumbent long distance carrier makes the same offer.

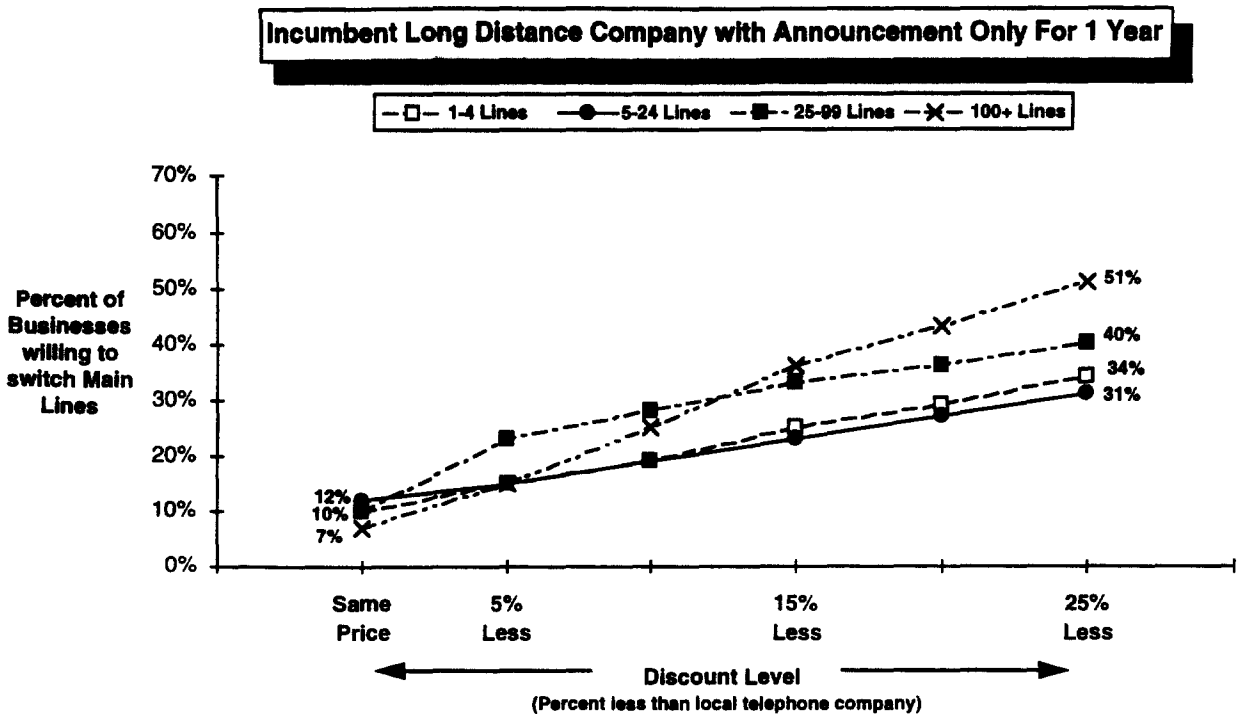
* Results for additional discount levels included in Appendix



(Percent of Businesses Scale: 4=75%, 3=50%, 2=25%, 1=0%)
(Note: Measures for 10% Less and 20% Less were interpolated from data collected).

Compared to all other elements tested, discount on local and toll services has a higher impact on a business' willingness to switch. As the discount increases from 0% to 25%, the percent of businesses willing to switch increases by 24 points (if offered by a long distance company with a number change requirement). Even with a number change and no discount , there is a segment of business customers (10%) who are likely to switch from their current local telephone provider to their long distance provider.

In addition, without number portability, one-third (34%) of all businesses would be willing to switch their main lines if offered a 25% discount by their long distance provider.



(Percent of Businesses Scale: 4=75%, 3=50%, 2=25%, 1=0%)
(Note: Measures for 10% Less and 20% Less were interpolated from data collected).

The impact of discounts is greater among larger businesses. While fewer businesses with more than 100 lines (only 7%) would switch their main lines to an incumbent long distance company if the cost was the same as it is now, more than half (51%) would switch if the discount was 25% off their current costs, even with an announcement for 1 year.

Meanwhile, it appears that businesses with 25-99 lines are more susceptible to switch if even a small discount is included in the offer. While only 10% of businesses within this category would switch if the cost was at parity with their local telephone company, almost one-quarter (23%) would switch to receive a 5% discount.

Incumbent Long Distance Company with Announcement Only For 1 Year

	Discount Level			
	Same Price	5% Less	15% Less	25% Less
Percent of Businesses willing to switch: (Based to universe of businesses with specific line type)				
Main Lines	10%	15%	25%	34%
Other Lines	11%	16%	27%	37%
DID Numbers	7%	19%	36%	43%
Percent of all lines that would be switched: (Based to universe of lines)				
Main Lines	2%	8%	14%	27%
Other Lines	7%	11%	21%	46%
DID Numbers	2%	4%	9%	13%

(Percent of Businesses Scale: 4=75%, 3=50%, 2=25%, 1=0%)

When evaluating the effects of discount incentives on the willingness to switch different line types, the willingness to switch main lines and "other" lines increases linearly in response to discount increases. However, DID numbers are particularly affected by discount increases. While only 7% of businesses would switch DID numbers at parity, almost one-fifth (19%) would switch for a 5% discount.

While it appears that discounts have similar impacts on the number of businesses willing to switch main lines and "other" lines, there were substantial differences in the proportion of main and "other" lines that would be switched under each scenario. "Other" lines, which are typically used for outbound traffic, appear to be more vulnerable than main lines to discounts. In fact, if a 25% discount were offered and a number change required, nearly one-half (46%) of all "other" lines would be switched. As "other" lines make up approximately three-fourths of the total lines, Pacific Bell would lose a substantial portion of its business under this scenario.

Incumbent Long Distance Company with Announcement Only For 1 Year

Discount Level

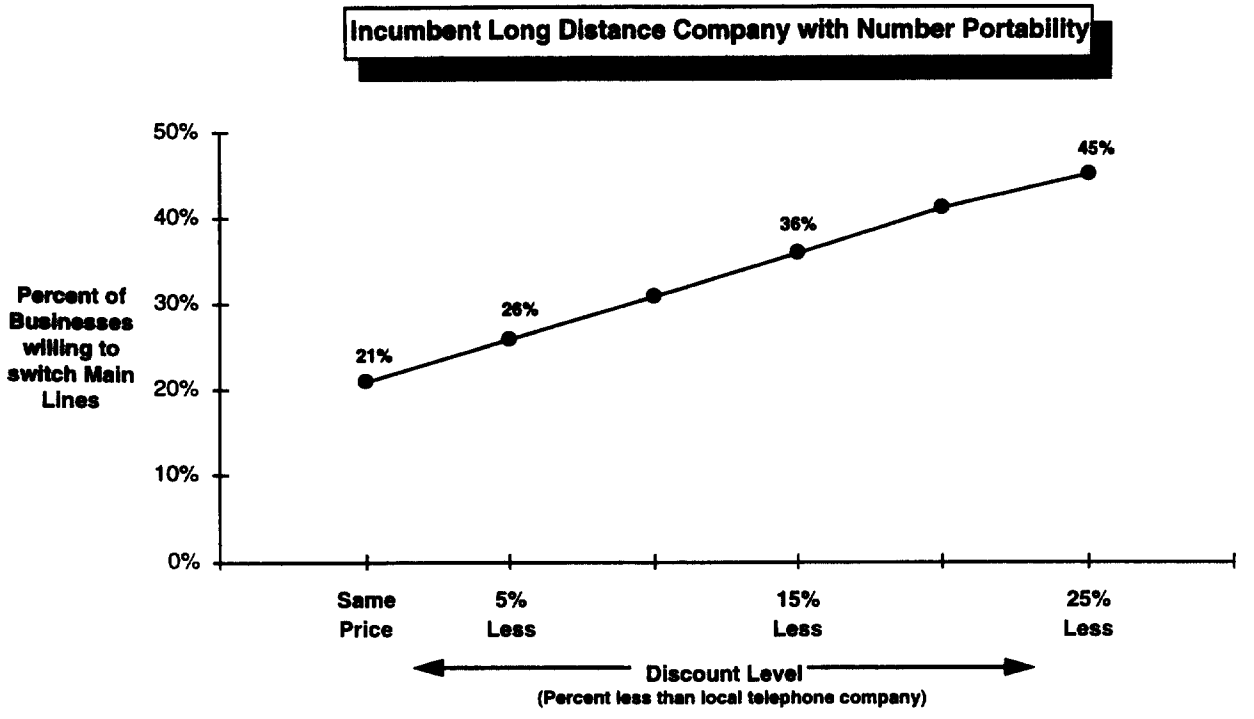
	[redacted]				[redacted]				[redacted]				[redacted]			
	Number of Lines				Number of Lines				Number of Lines				Number of Lines			
	1-4	5-24	25-99	100+	1-4	5-24	25-99	100+	1-4	5-24	25-99	100+	1-4	5-24	25-99	100+
Percent of Businesses willing to switch: (Based to universe of businesses with specific line type)																
Main Lines.....	10%	12%	10%	7%	15%	15%	23%	15%	25%	23%	33%	36%	34%	31%	40%	51%
Other Lines.....	10%	13%	12%	8%	15%	18%	27%	16%	26%	27%	42%	41%	36%	37%	49%	56%
Percent of all lines that would be switched: (Based to universe of lines)																
Main Lines.....	3%	5%	1%	1%	8%	6%	24%	3%	16%	13%	26%	6%	25%	19%	32%	22%
Other Lines.....	2%	7%	3%	7%	6%	13%	13%	10%	13%	20%	20%	20%	19%	27%	44%	46%

(Percent of Businesses Scale: 4=75%, 3=50%, 2=25%, 1=0%)

(Note: Data for DID Numbers are not shown as the sample sizes within segments are too small for analysis).

When analyzing the effects of discounting strategies on line type by business category, it appears that businesses with 25-99 lines are particularly susceptible to even a small discount. At parity, only 10% of these businesses would switch their main lines and 12% would switch their "other" lines, having a negligible affect on the actual lines switched. However, when offered a only 5% discount, the percent of these businesses willing to switch their main lines (23%) and "other" lines (27%) more than doubles.

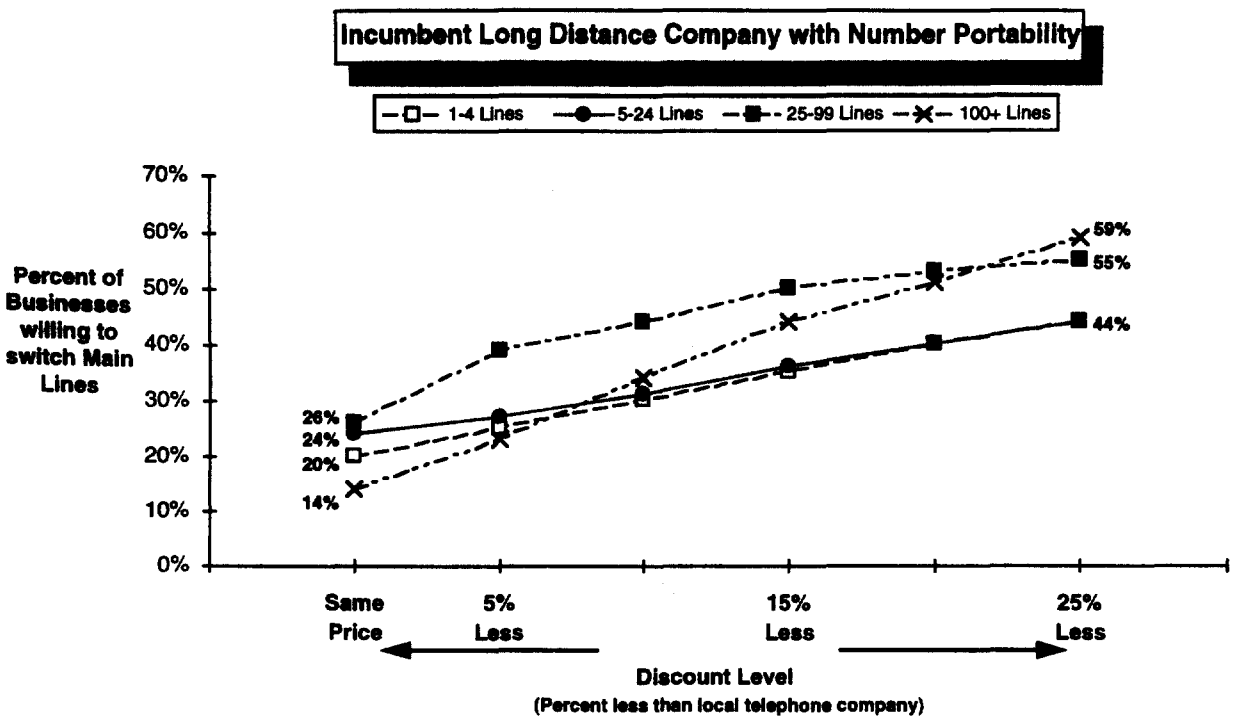
Among businesses with 100 or more lines, the percent of businesses willing to switch doubles with 5% and 15% discounts. Further, the potential business loss for Pacific Bell would be substantial if a 25% discount were offered, as more than half of these businesses would switch their main lines and "other" lines. And while 22% of all main lines in this segment would be switched, almost one-half (46%) of this segment's "other" lines would be switched.



(Percent of Businesses Scale: 4=75%, 3=50%, 2=25%, 1=0%)
(Note: Measures for 10% Less and 20% Less were interpolated from data collected).

If number portability is enacted, and local, toll and long distance services are offered by the incumbent long distance company, one-fifth (21%) of businesses would switch their main lines without any discount.

The opportunity for alternate providers to gain substantial share by manipulating pricing is substantial, as the percent of businesses willing to switch their main lines increases to almost one-half (45%) if offered a 25% discount under this scenario.



(Percent of Businesses Scale: 4=75%, 3=50%, 2=25%, 1=0%)
(Note: Measures for 10% Less and 20% Less were interpolated from data collected).

With number portability, Pacific Bell stands to lose a substantial proportion of customers, especially among medium and large businesses.

Six out of ten businesses with 100 or more lines (59%) would be willing to switch if offered a 25% discount. Compared to a 25% discount and no number portability (see page 45), only 8% more large businesses are willing to switch if they don't have to change their number. Even with no discount the potential to lose about one quarter of all businesses exists with number portability.

Incumbent Long Distance Company with Number Portability

	Discount Level			
	Same Price	5% Less	15% Less	25% Less
Percent of Businesses willing to switch: (Based to universe of businesses with specific line type)				
Main Lines	21%	26%	36%	45%
Other Lines	20%	26%	37%	46%
DID Numbers	16%	27%	44%	51%
Percent of all lines that would be switched: (Based to universe of lines)				
Main Lines	11%	19%	30%	48%
Other Lines	9%	16%	29%	56%
DID Numbers	10%	15%	25%	31%

(Percent of Businesses Scale: 4=75%, 3=50%, 2=25%, 1=0%)

Unlike a scenario when a number change is required, under number portability, the percent of "other" lines that would be switched is about the same as the percent of main lines that would be switched (or greater with a large enough discount).

Similarly, in previous scenarios where number portability was unavailable, there was a greater resistance to changing DID numbers. However, with number portability, this resistance declines. For 15% less, one-quarter (25%) of all DID numbers would be affected, compared to 9% if a number change is required.

At worst case, with number portability and a 25% discount, almost half of all businesses would be willing to switch their main lines (45%) and "other" lines (46%), while one-half (51%) would switch DID numbers. If this occurred, Pacific Bell could expect to lose 48% of all main lines, 56% of all "other" lines, and 31% of all DID numbers.

Incumbent Long Distance Company with Number Portability

Discount Level

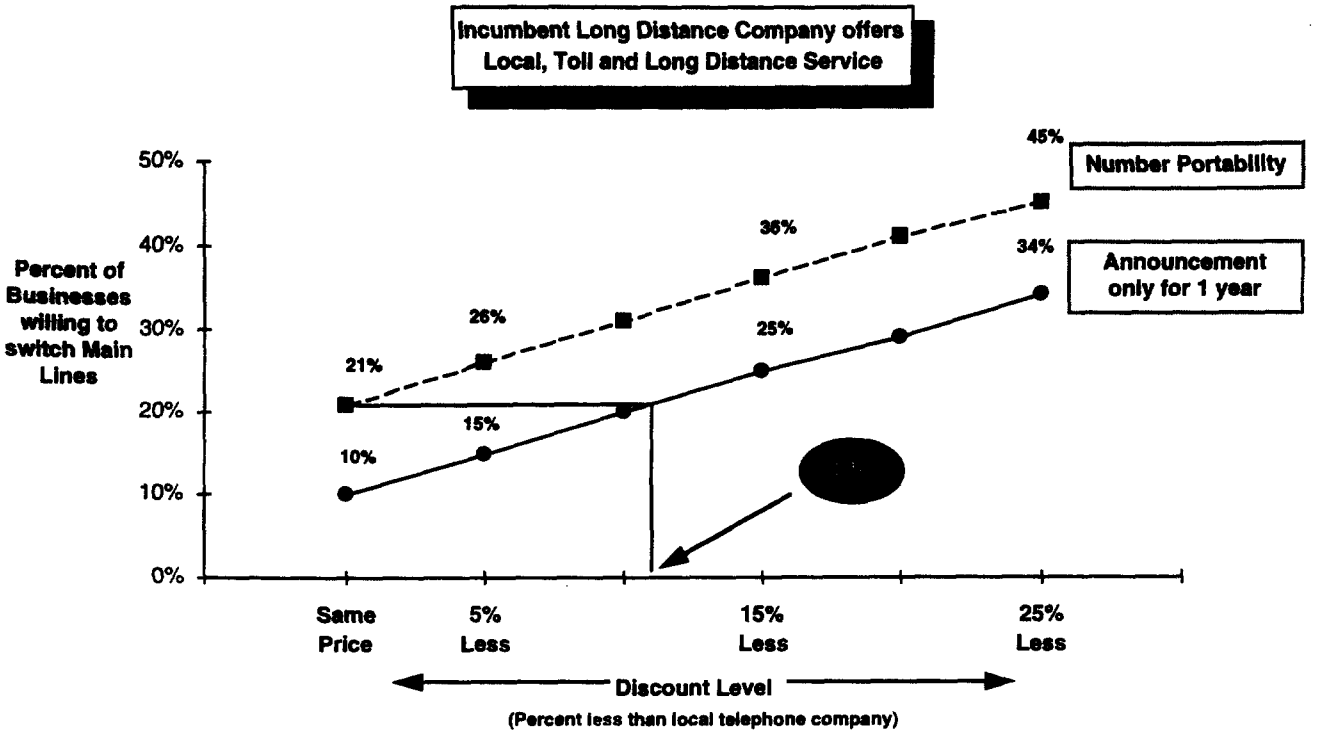
	[redacted]				[redacted]				[redacted]				[redacted]			
	Number of Lines				Number of Lines				Number of Lines				Number of Lines			
	1-4	5-24	25-99	100+	1-4	5-24	25-99	100+	1-4	5-24	25-99	100+	1-4	5-24	25-99	100+
Percent of Businesses willing to switch: (Based to universe of businesses with specific line type)																
Main Lines.....20%	24%	28%	14%		25%	27%	39%	23%	35%	36%	50%	44%	44%	44%	55%	59%
Other Lines.....18%	23%	25%	14%		24%	28%	40%	23%	35%	38%	55%	48%	44%	47%	61%	62%
Percent of all lines that would be switched: (Based to universe of lines)																
Main Lines.....9%	11%	13%	8%		15%	14%	44%	12%	27%	22%	53%	20%	37%	31%	58%	43%
Other Lines.....6%	12%	7%	9%		9%	18%	19%	14%	19%	27%	32%	27%	25%	34%	54%	55%

(Percent of Businesses Scale: 4=75%, 3=50%, 2=25%, 1=0%)

(Note: Data for DID Numbers are not shown as the sample sizes within segments are too small for analysis).

If number portability was available, it appears that small and medium business customers (under 100 lines) are more vulnerable to switching in a parity pricing situation (from 20% to 26% will switch main lines). However, fewer large businesses (with 100 or more lines) will switch without a discount (14%).

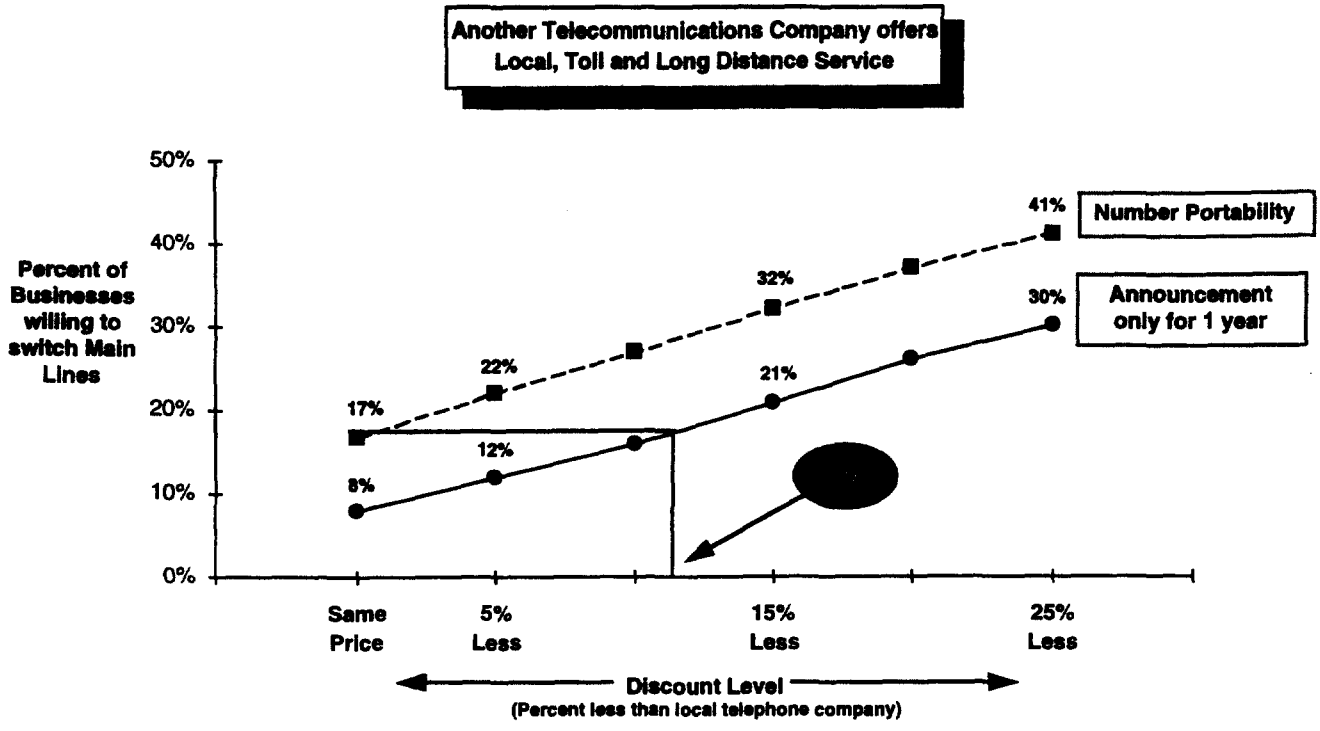
Trade-off Between Service Discount and Number Portability



(Percent of Businesses Scale: 4=75%, 3=50%, 2=25%, 1=0%)
(Note: Measures for 10% Less and 20% Less were interpolated from data collected).

The value of a main line incumbent number is equivalent to approximately a 12% discount on local and toll telephone services. In a parity situation (same price, number portability), one-fifth (21%) of all businesses would be willing to switch main lines. To garner the same proportion if number portability is not available, incumbent long distance providers will need to offer local and toll service for approximately 12% less than Pacific Bell.

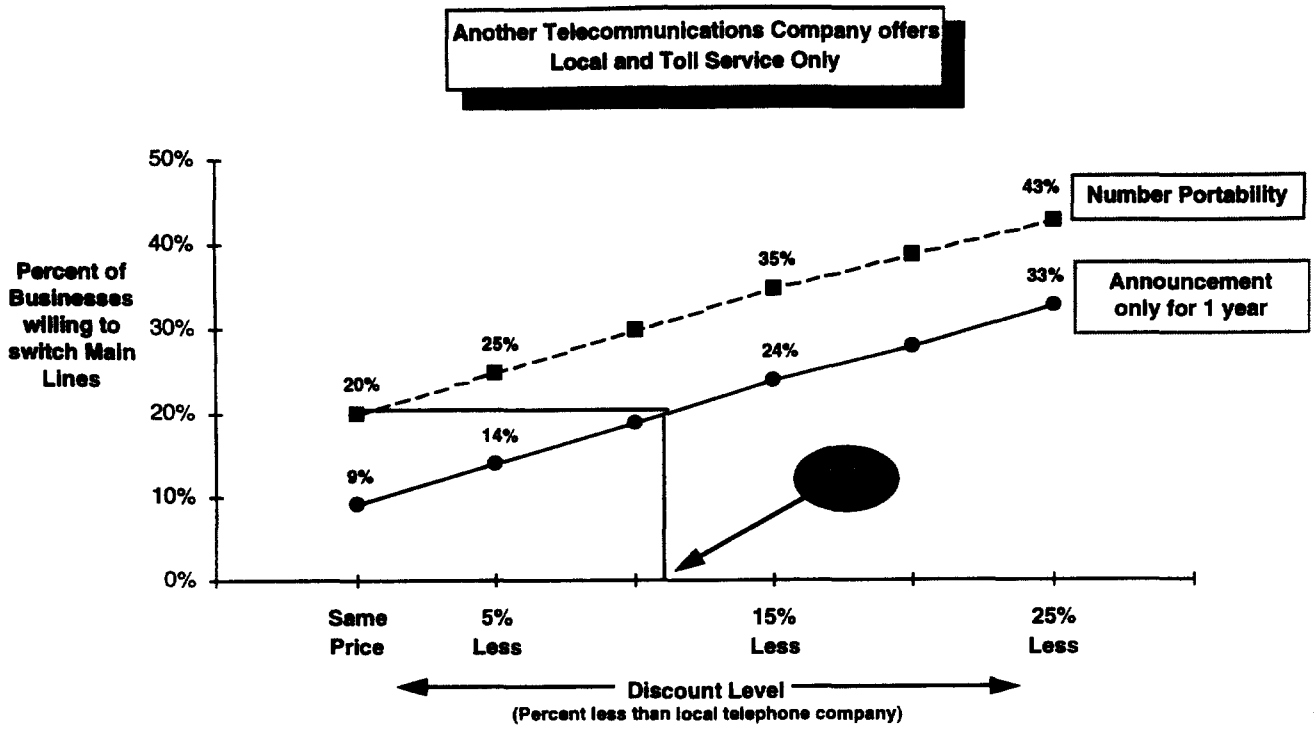
Trade-off Between Service Discount and Number Portability



(Percent of Businesses Scale: 4=75%, 3=50%, 2=25%, 1=0%)
(Note: Measures for 10% Less and 20% Less were interpolated from data collected).

Regardless of the "brand" of the company, approximately the same discount (11%-12%) is required to overcome the lack of number portability.

Trade-off Between Service Discount and Number Portability



(Percent of Businesses Scale: 4=75%, 3=50%, 2=25%, 1=0%)
(Note: Measures for 10% Less and 20% Less were interpolated from data collected).

Even if bundled services are not available, a 12% discount on local and toll services offered by another telecommunications provider with a number change will provide an equivalent potential market as offering no discount with number portability.

Value of Number Portability by Business Characteristics

		Incumbent Long Distance Company Offers Service for 15% Discount *		
		Percent of Businesses Willing to Switch Main Lines		
		Announcement for 1 year	Number Portability	Change
Business Size (by number of employees)				
• Small (1 - 9)	(n=179/82%)	25%	36%	+11
• Medium (10 - 99)	(n=170/16%)	22%	35%	+13
• Large (100 +)	(n=170/2%)	22%	38%	+16
Number of Locations (in California)				
• One	(n=338/84%)	25%	36%	+11
• Two or more	(n=181/16%)	26%	36%	+10
Centralized Decision Making (if 2+ locations)				
• Yes	(n=99/53%)	28%	38%	+10
• No	(n=60/ 47%)	22%	33%	+11

To answer the objective of which types of businesses will be most impacted by having to switch their telephone numbers, the proportion of businesses that would be willing to switch main lines with and without number portability (with all other elements held constant) was evaluated among businesses with different characteristics.

Looking at business size by number of employees, large businesses (100 or more employees) are more impacted by the availability of number portability than smaller business (+16 versus +13 or +11). However, this segment makes up only 2% of the overall business market.

The number of locations and decision-making practices do not have an impact on the value of keeping a telephone number.

* Results for additional discount levels included in Appendix